



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/765,172	01/28/2004	Martin Bureau	11453-1	9848

25277 7590 02/06/2006

NATIONAL RESEARCH COUNCIL OF CANADA
1500 MONTREAL ROAD
BLDG M-58, ROOM EG12
OTTAWA, ONTARIO, K1A 0R6
CANADA

EXAMINER

LONEY, DONALD J

ART UNIT PAPER NUMBER

1772

DATE MAILED: 02/06/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/765,172

Applicant(s)

BUREAU ET AL.

Examiner

Donald Loney

Art Unit

1772

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 25 November 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 4, 5, 6, 9 and 12 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claims 4, 5, 9 and 12 "the polymer" is recited. It is unclear as to which one this refers to since claim 1 was amended to include the member as a polymer, in addition to the overlay, therefore, two polymers are now recited.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1-6, 8-11 and 15-17 are rejected under 35 U.S.C. 102(e) as being anticipated by Pabedinskas et al (6844040).

Pabedinskas et al discloses a polymer core member 2, 5, 7, 10 or 30 with a polymer overlay 3, 4, 6 or 32. Both the core and overlay are reinforced with fibers. Refer to figures 1-4 and 15. Figure 15 specifically shows the overlay being welded to the core 30 using heat and pressure (instant claim 1 and 15). Also refer to column 4, lines 13-57, column 6, lines 28-64 and column 9, lines 20-41. Per claims 6 and 8, an additional layer is shown on the opposite sides of the member in figures 1-4, along with the profile being hollow. The fibers are cellulosic (i.e. wood) per instant claim 10

5. Claims 1-6, 8, 9 and 15-17 are rejected under 35 U.S.C. 102(b) as being anticipated by Fell (531,6604).

Fell discloses a polymer core member 1 with a polymer overlay 2. Both the core and overlay are reinforced with fibers. Refer to figures 1-3. The overlays are fused to the core using heat and pressure (per instant claim 1 and 15). Also refer to column 4, lines 3-45. Per claims 6 and 8, an additional layer is shown on the opposite sides of the member in figures 1-3, along with the profile being hollow (i.e. its honeycomb).

6. Claims 1-7 and 15-17 are rejected under 35 U.S.C. 102(b) as being anticipated by Smith (3995980).

Smith discloses a polymer core member 30' with a polymer overlay 30' and 24'. Both the core and overlay are reinforced with fibers. The overlays are fused to the core using heat and pressure (per instant claim 1 and 15). Refer to the three figures at the bottom right of figure 1 along with the Abstract and column 1, line 63 through column 2, line 10. Per claims 6 and 7, an additional layer is shown on the opposite sides of the member in figure 1, along with the member 30' being solid.

Art Unit: 1772

7. Claims 1-7 and 15-17 are rejected under 35 U.S.C. 102(b) as being anticipated by WO 00/78541 to Dubelsten et al.

Dubelsten et al discloses a polymer core member c with a polymer overlay F₁ and F₂ in figures 13 and 14. Both the core and overlay are reinforced with fibers. The overlays are melted (i.e. fused and/or welded) to the core using a heat and pressure (per instant claim 1 and 15). Refer to page 5, lines 5-30, page 10, lines 3-20, page 11, lines 5-15 and page 12, lines 1-9. Per claims 6 and 7, an additional layer is shown on the opposite sides of the member in figure 1, along with the member 30' being solid.

Claim Rejections - 35 USC § 103.

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Art Unit: 1772

10. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

11. Claims 8-14 are rejected under 35 U.S.C. 103(a) as being unpatentable over WO 00/78541 to Dubelsten et al in view of Pabedinskas et al.

The primary reference teaches the invention substantially as recited except for the hollow profile for the member. See the 35 U.S.C. 102 rejection above.

Pabedinskas et al discloses one can form the core of a composite fiber reinforced article with a hollow profile. See 35 USC 102 rejection above.

12. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to Dubelsten et al to form the core with a hollow structure, as taught by Pabedinskas et al, motivated by the fact this would let one use less material therefore which would be financially beneficial. It also would let one form a larger core with less weight. Both Dubelsten et al and Pabedinskas et al disclose wood fibers per instant claims 10 and 14. Dubelsten et al teaches a fabric per claim 12 on page 13, lines 5-9. Pabedinskas et al shows square chambers per claim 13 in figures 1, 2 and 4.

1. Claims 12-14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pabedinskas et al in view of Kimura et al (6060144).

The primary reference teaches the invention substantially as recited except for the fiber reinforced fabric per claim 12. See the 35 U.S.C. 102 rejection above.

Kimura et al teaches to use a fabric reinforced polymer layer 3 as the outer layer on a hollow core 5 used in building and automotive applications. Refer to figure 1 and column 3, line 38 through column 4, line 26.

Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to include a fabric reinforced polymer as the outer layer, as taught by Kimura et al, in order to impart a fabric structure to the outer surface thereof.

Response to Arguments

2. Applicant's arguments with respect to claims 1-17 have been considered but are moot in view of the new ground(s) of rejection.

3. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

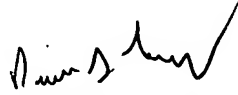
Art Unit: 1772

the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Donald Loney whose telephone number is (571) 272-1493. The examiner can normally be reached on Mon, Tues, Thurs and Fri. 8AM-4PM, flex schedule.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harold Pyon can be reached on 571 272-1498. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Donald Loney
Primary Examiner
Art Unit 1772

DJL;D.Loney
02/02/06